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(54) Title: ErbB-2 RECEPTOR TARGETING PEPTIDE

(57) **Abstract:** The ErbB-2 receptor, a member of the tyrosine kinase type 1 family of receptors, has been implicated in many human malignancies. Bacteriophage display technology was employed to identify peptides that bound to the extracellular domain of human ErbB-2. The peptide KCCYSL, most frequently occurring in the affinity selected population, was chemically synthesized and characterized for its binding activities to the recombinant extracellular domain of ErbB-2. The synthetic peptide exhibits high specificity to ErbB-2 as well as to ErbB-1, another member of ErbB family. Thus, this peptide can be employed in cancer imaging or therapeutic agent targeting to malignant cells ErbB-2 receptor.

## INTERNATIONAL SEARCH REPORT

International	ation No
PCT/US2004/021150	

A. CLASSIFICATION OF SUBJECT MATTER		
IPC 7	C07D487/04	A61K31/4985

According to International Patent Classification (IPC) or to both national classification and IPC
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B. FIELDS SEARCHED
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Minimum documentation searched (classification system followed by classification symbols)
IPC 7 C07D A61K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched
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Electronic data base consulted during the international search (name of data base and, where practical, search terms used)
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EPO-Internal, WPI Data, PAJ, CHEM ABS Data
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C. DOCUMENTS CONSIDERED TO BE RELEVANT
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Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 02/060492 A (CYTOPIA PTY LTD ; BURNS CHRISTOPHER JOHN (AU); WILKS ANDREW FREDERICK) 8 August 2002 (2002-08-08) the whole document claims 7-17, 25-34	1-62
P, A	WO 03/089434 A (CELLULAR GENOMICS INC) 30 October 2003 (2003-10-30) the whole document	1-62
P, X	WO 2004/022562 A (CELLULAR GENOMICS INC) 18 March 2004 (2004-03-18) the whole document	1-62
P, X	WO 2004/026877 A (SCHERING CORP) 1 April 2004 (2004-04-01) the whole document	1-62

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<input checked="" type="checkbox"/> Patent family members are listed in annex.
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Date of the actual completion of the international search	Date of mailing of the International search report
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15 November 2004	08/12/2004
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**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International cation No
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